Practice: 338 - Prescribed Burning Scenario: #1 - Understory Burn

# **Scenario Description:**

Prescribed burning is accomplished in 20 acre increments to limit the off-site disruption of the burn. The burn is managed to keep the fire cool enough to not cause mortality to residulate stand, but also to burn hot enough to reduce the understory accomulation of residues. The prescribed burn is applied according to a designed burn plan and the NRCS prescribed burning (338) standard. The fire hazard is reduced by reducing the fuel load available in the understory.

Associated Practice(s): Firebreak(394)

# **Before Situation:**

An over accumulation of undersirable vegetation in the understory has a substantial wildfire risk due to the fuel load available in the understory. Leaf litter and debris are present throughout the stand. Competing and/or invasive species are hindering growth of desirable species.

### **After Situation:**

A licensed entity implements a prescribed burn on 20 acres to enhance the native species stand and reduce wildlfire risks. The prescribed burn controls competing and/or invasive species. Growing conditions are altered to enhance health and productivity of the more desirable plants.

Scenario Feature Measure: Acres planned

Scenario Unit: Acre

Scenario Typical Size: 20

Scenario Cost: \$1,706.28 Scenario Cost/Unit: \$85.31

Cost Details (by catego	-	Component Description	Unit	Price (\$/unit)	Quantity	Cost
Equipment/Installation	יםו	component bescription	Oilit	(\$/unit)	Quantity	COSC
Truck, Pickup	939	Equipment and power unit costs. Labor not included.	Hour	\$36.36	8	\$290.88
Water tank, portable		Portable water tank transported in a pick up truck. Typically with 200 gallon capacity includes tank with pump, hose and sprayer. Does not include the pickup truck. Equipment only.	Hour	\$2.53	8	\$20.24
All terrain vehicles, ATV	965	Includes equipment, power unit and labor costs.	Hour	\$30.03	8	\$240.24
Labor						
Skilled Labor		Labor requiring a high level skill set: Includes carpenters, welders, electricians, conservation professionals involved with data collection, monitoring, and or record keeping, etc.	Hour	\$39.38	16	\$630.08
Supervisor or Manager		Labor involving supervision or management activities. Includes crew supervisors, foremen and farm/ranch managers time required for adopting new technology, etc.	Hour	\$45.14	4	\$180.56
Specialist Labor		Labor requiring a specialized skill set: Includes Agronomists, Foresters, Biologists, etc. to provide additional technical information during the planning and implementation of the practice. Does not include NRCS or TSP services.	Hour	\$98.69	2	\$197.38
Materials						
Fuel, ignition fuel mixture		Mixture of gasoline and diesel for ignition of prescribed burns. Materials only.	Gallon	\$3.82	2	\$7.64
Mobilization						
Mobilization, very small equipment		Equipment that is small enough to be transported by a pick- up truck with typical weights less than 3,500 pounds. Can be multiple pieces of equipment if all hauled simultaneously.	Each	\$69.63	2	\$139.26

Practice: 338 - Prescribed Burning Scenario: #2 - Site Preparation

#### **Scenario Description:**

A prescribed burn is implemented on a 5 acre site to eliminate the existing competition and debris to prepare site for planting, seeding, or permit natural seeding. A small 5 acre opening is created to promote a forest savannah habit within a forest that maintains early successional habitat for wildlife. Multiple sites are typically created throughout a management area. Small sites require intense management to ensure desired objectives are met and to reduce risk within forest stand.

Associated Practice(s): Firebreak(394), Early Successional Habitat/Management (647), Upland Wildlife Habitat Management (645)

### **Before Situation:**

A site that was recently managed to remove the overstory has remaining slash, brush and grasses that dominate the site providing inadequate cover/shelter and food for desired wildlife species.

#### **After Situation:**

A prescribed burn is implemented on the 5 acre site to eliminate the existing competition and debris. The grass, competing brush, and downed slah leftover from forestry activities are managed through the burn. Some bare ground is exposed. The burn alters the site to create forest openings. The burn prepares the site for seeding of early successional habitat or planting of desired vegetation. The altered site conditions promote growth of desired species to create a diverse plant community with adequate food and cover for wildlife.

Scenario Feature Measure: Acres planned

Scenario Unit: Acre

Scenario Typical Size: 5

Scenario Cost: \$922.77 Scenario Cost/Unit: \$184.55

Cost Details (by category):				Price		
Component Name	ID	Component Description	Unit	(\$/unit)	Quantity	Cost
Equipment/Installation						
Water tank, portable		Portable water tank transported in a pick up truck. Typically with 200 gallon capacity includes tank with pump, hose and sprayer. Does not include the pickup truck. Equipment only.	Hour	\$2.53	4	\$10.12
All terrain vehicles, ATV	965	Includes equipment, power unit and labor costs.	Hour	\$30.03	4	\$120.12
Truck, Pickup	939	Equipment and power unit costs. Labor not included.	Hour	\$36.36	4	\$145.44
Labor						
Specialist Labor		Labor requiring a specialized skill set: Includes Agronomists, Foresters, Biologists, etc. to provide additional technical information during the planning and implementation of the practice. Does not include NRCS or TSP services.	Hour	\$98.69	1	\$98.69
Supervisor or Manager		Labor involving supervision or management activities. Includes crew supervisors, foremen and farm/ranch managers time required for adopting new technology, etc.	Hour	\$45.14	2	\$90.28
Skilled Labor		Labor requiring a high level skill set: Includes carpenters, welders, electricians, conservation professionals involved with data collection, monitoring, and or record keeping, etc	Hour	\$39.38	8	\$315.04
Materials						
Fuel, ignition fuel mixture		Mixture of gasoline and diesel for ignition of prescribed burns. Materials only.	Gallon	\$3.82	1	\$3.82
Mobilization						
Mobilization, very small equipment		Equipment that is small enough to be transported by a pick- up truck with typical weights less than 3,500 pounds. Can be multiple pieces of equipment if all hauled simultaneously.	Each	\$69.63	2	\$139.26

Practice: 338 - Prescribed Burning Scenario: #3 - Herbaceous Fuel

## **Scenario Description:**

A prescribed burn is applied on 50 acres according to a design burn plan and the NRCS Prescribed Burning standard and specifications to control undersirable species, improve wildlife habitat, improve plant productivity and/or quality, and maintain ecological processes. A typical 50 acre parcel with herbaceous and/or low volatile woody fuel with no high volatile fuels is burned. Burned firbreaks used to achieve total firebreak width are part of these burns, but the construction of the firebreak is not included.

Associated Practice(s): Firebreak (394) Upland Wildlife Management Habitat Management (645)

# **Before Situation:**

A parcel of land with herbaceous fuel and/ or low volatile woody fuel with no high volatile fuels has undesirable plant composition due to reduced plant vigor, competing and invasive species, or improper livestock distribution.

#### **After Situation:**

The desirable plant composition is restored, plant vigor improved and invasive species reduced. Habitat component for wildlife is improved.

Scenario Feature Measure: Acres planned

Scenario Unit: Acre

Scenario Typical Size: 50

Scenario Cost: \$1,935.90 Scenario Cost/Unit: \$38.72

Cost Details (by catego Component Name	-	Component Description	Unit	Price (\$/unit)	Quantity	Cost
Acquisition of Technical Kn		Component Bessingtion	<u> </u>	(\$/unit)	Quantity	
Training, Workshops	294	Educational seminar or series of meetings emphasizing interaction and exchange of information among a usually small number of participants.	Each	\$41.42	1	\$41.42
Equipment/Installation					<u> </u>	
Water tank, portable		Portable water tank transported in a pick up truck. Typically with 200 gallon capacity includes tank with pump, hose and sprayer. Does not include the pickup truck. Equipment only.	Hour	\$2.53	8	\$20.24
All terrain vehicles, ATV	965	Includes equipment, power unit and labor costs.	Hour	\$30.03	8	\$240.24
Truck, Pickup	939	Equipment and power unit costs. Labor not included.	Hour	\$36.36	8	\$290.88
Labor	·			·	•	•
Specialist Labor		Labor requiring a specialized skill set: Includes Agronomists, Foresters, Biologists, etc. to provide additional technical information during the planning and implementation of the practice. Does not include NRCS or TSP services.	Hour	\$98.69	2	\$197.38
Supervisor or Manager		Labor involving supervision or management activities. Includes crew supervisors, foremen and farm/ranch managers time required for adopting new technology, etc.	Hour	\$45.14	8	\$361.12
Skilled Labor		Labor requiring a high level skill set: Includes carpenters, welders, electricians, conservation professionals involved with data collection, monitoring, and or record keeping, etc	Hour	\$39.38	16	\$630.08
Materials						
Fuel, ignition fuel mixture		Mixture of gasoline and diesel for ignition of prescribed burns. Materials only.	Gallon	\$3.82	4	\$15.28
Mobilization	•					
Mobilization, very small equipment		Equipment that is small enough to be transported by a pick- up truck with typical weights less than 3,500 pounds. Can be multiple pieces of equipment if all hauled simultaneously.	Each	\$69.63	2	\$139.26

Practice: 338 - Prescribed Burning Scenario: #4 - Volatile fuels < 4 ft tall

## **Scenario Description:**

A prescribed burn is applied on 50 acres according to a design burn plan and the NRCS Prescribed Burning standard and specifications to control undersirable species, improve wildlife habitat, improve plant productivity and/or quality, and maintain ecological processes. A typical 50 acre parcel with herbaceous and/or low volatile woody fuel and high volatile woody fuels less than 4 feet tall are burned. Burned firbreaks used to achieve total firebreak width are part of these burns, but the construction of the firebreak is not included.

Associated Practice(s): Firebreak (394) Upland Wildlife Habitat Management (645)

### **Before Situation:**

A parcel of land with herbaceous fuel and/ or low volatile woody fuel and high volatile woody fuels less than 4 feet tall has undesirable plant composition due to reduced plant vigor, competing and invasive species, or improper livestock distribution.

#### **After Situation:**

The desirable plant composition is restored, plant vigor improved and invasive species reduced. Forage production and quality for livestock and /or wildlife is improved.

Scenario Feature Measure: Acres planned

Scenario Unit: Acre

Scenario Typical Size: 50

Scenario Cost: \$2,530.19 Scenario Cost/Unit: \$50.60

y):			Price		
ID	Component Description	Unit	(\$/unit)	Quantity	Cost
wledge					
	Educational seminar or series of meetings emphasizing interaction and exchange of information among a usually small number of participants.	Each	\$41.42	1	\$41.42
	Portable water tank transported in a pick up truck. Typically with 200 gallon capacity includes tank with pump, hose and sprayer. Does not include the pickup truck. Equipment only.	Hour	\$2.53	8	\$20.24
965	Includes equipment, power unit and labor costs.	Hour	\$30.03	8	\$240.24
939	Equipment and power unit costs. Labor not included.	Hour	\$36.36	8	\$290.88
	welders, electricians, conservation professionals involved	Hour	\$39.38	24	\$945.12
	Labor involving supervision or management activities. Includes crew supervisors, foremen and farm/ranch managers time required for adopting new technology, etc.	Hour	\$45.14	12	\$541.68
	Labor requiring a specialized skill set: Includes Agronomists, Foresters, Biologists, etc. to provide additional technical information during the planning and implementation of the practice. Does not include NRCS or TSP services.	Hour	\$98.69	3	\$296.07
	Mixture of gasoline and diesel for ignition of prescribed burns. Materials only.	Gallon	\$3.82	4	\$15.28
	Equipment that is small enough to be transported by a pick- up truck with typical weights less than 3,500 pounds. Can be multiple pieces of equipment if all hauled simultaneously.	Each	\$69.63	2	\$139.26
	1602   965   939   230   234   235	294   Educational seminar or series of meetings emphasizing interaction and exchange of information among a usually small number of participants.    1602   Portable water tank transported in a pick up truck. Typically with 200 gallon capacity includes tank with pump, hose and sprayer. Does not include the pickup truck. Equipment only.    965   Includes equipment, power unit and labor costs.   939   Equipment and power unit costs. Labor not included.    230   Labor requiring a high level skill set: Includes carpenters, welders, electricians, conservation professionals involved with data collection, monitoring, and or record keeping, etc.   234   Labor involving supervision or management activities. Includes crew supervisors, foremen and farm/ranch managers time required for adopting new technology, etc.   235   Labor requiring a specialized skill set: Includes Agronomists, Foresters, Biologists, etc. to provide additional technical information during the planning and implementation of the practice. Does not include NRCS or TSP services.    1596   Mixture of gasoline and diesel for ignition of prescribed burns. Materials only.   1137   Equipment that is small enough to be transported by a pickup truck with typical weights less than 3,500 pounds. Can be multiple pieces of equipment if all hauled	294   Educational seminar or series of meetings emphasizing interaction and exchange of information among a usually small number of participants.   Each	### ID Component Description  ### Wiledge    294   Educational seminar or series of meetings emphasizing interaction and exchange of information among a usually small number of participants.	ID Component Description  Wiedge  294 Educational seminar or series of meetings emphasizing interaction and exchange of information among a usually small number of participants.  1602 Portable water tank transported in a pick up truck. Typically with 200 gallon capacity includes tank with pump, hose and sprayer. Does not include the pickup truck. Equipment only.  965 Includes equipment, power unit and labor costs.  939 Equipment and power unit costs. Labor not included. Hour \$30.03 8  230 Labor requiring a high level skill set: Includes carpenters, welders, electricians, conservation professionals involved with data collection, monitoring, and or record keeping, etc.  234 Labor involving supervision or management activities. Includes crew supervisors, foremen and farm/ranch managers time required for adopting new technology, etc.  235 Labor requiring a specialized skill set: Includes Agronomists, Foresters, Biologists, etc. to provide additional technical information during the planning and implementation of the practice. Does not include NRCS or TSP services.  1596 Mixture of gasoline and diesel for ignition of prescribed burns. Materials only.  1137 Equipment that is small enough to be transported by a pick-up truck with typical weights less than 3,500 pounds. Can be multiple pieces of equipment if all hauled

Practice: 338 - Prescribed Burning Scenario: #5 - Volatile fuels > 4 ft tall

## **Scenario Description:**

A prescribed burn is applied on 50 acres according to a design burn plan and the NRCS Prescribed Burning standard and specifications to control undersirable species, improve wildlife habitat, improve plant productivity and/or quality, and maintain ecological processes. A typical 50 acre parcel with herbaceous and/or low volatile woody fuel and high volatile woody fuels greater than 4 feet tall are burned. Burned firbreaks used to achieve total firebreak width are part of these burns, but the construction of the firebreak is not included.

Associated Practice(s): Firebreak (394), Upland Wildlife Habitat Management (645)

### **Before Situation:**

A parcel of land with herbaceous fuel and/or low volatile woody fuel and high volatile woody fuels greater than 4 feet tall has undesirable plant composition due to reduced plant vigor, competing and invasive species, or improper livestock distribution.

#### **After Situation:**

The desirable plant composition is restored, plant vigor improved and invasive species reduced. Forage production and quality for livestock and /or wildlife is improved.

Scenario Feature Measure: Acres planned

Scenario Unit: Acre

Scenario Typical Size: 50

Scenario Cost: \$3,089.30 Scenario Cost/Unit: \$61.79

Cost Details (by categor Component Name	,, ID	Component Description	Unit	Price (\$/unit)	Quantity	Cost
Acquisition of Technical Kno				(3/uiiit)	ζ	
Training, Workshops	294	Educational seminar or series of meetings emphasizing interaction and exchange of information among a usually small number of participants.	Each	\$41.42	2	\$82.84
Equipment/Installation						
All terrain vehicles, ATV	965	Includes equipment, power unit and labor costs.	Hour	\$30.03	8	\$240.24
Trailer, water tank	1598	Mobile 5,000 gal water tank mounted on a trailer. Equipment only. Does not include towing equipment.	Hour	\$19.59	8	\$156.72
Water tank, portable	1602	Portable water tank transported in a pick up truck. Typically with 200 gallon capacity includes tank with pump, hose and sprayer. Does not include the pickup truck. Equipment only.	Hour	\$2.53	12	\$30.36
Truck, Pickup	939	Equipment and power unit costs. Labor not included.	Hour	\$36.36	8	\$290.88
Labor						
Specialist Labor	235	Labor requiring a specialized skill set: Includes Agronomists, Foresters, Biologists, etc. to provide additional technical information during the planning and implementation of the practice. Does not include NRCS or TSP services.	Hour	\$98.69	4	\$394.76
Supervisor or Manager	234	Labor involving supervision or management activities. Includes crew supervisors, foremen and farm/ranch managers time required for adopting new technology, etc.	Hour	\$45.14	12	\$541.68
Skilled Labor	230	Labor requiring a high level skill set: Includes carpenters, welders, electricians, conservation professionals involved with data collection, monitoring, and or record keeping, etc.	Hour	\$39.38	24	\$945.12
Materials						
Fuel, ignition fuel mixture		Mixture of gasoline and diesel for ignition of prescribed burns. Materials only.	Gallon	\$3.82	4	\$15.28
Mobilization						
Mobilization, medium equipment	1139	Equipment with 70-150 HP or typical weights between 14,000 and 30,000 pounds.	Each	\$252.16	1	\$252.16

# Mobilization

Mobilization, very small	1137 Equipment that is small enough to be transported by a pick	Each	\$69.63	2	\$139.26
equipment	up truck with typical weights less than 3,500 pounds. Can				
	be multiple pieces of equipment if all hauled				
	simultaneously.				